Commencement Address

University of New Orleans, New Orleans, Louisiana May 21, 2004

Congratulations to the soon-to-be graduates and new alumni of the University of New Orleans. I am pleased and honored to be here this evening as part of this celebration of <u>your</u> accomplishments. You have studied, worked, and labored for years to earn the degree you will receive this evening. The only thing separating you from that degree is one single commencement address, which will be short.

I have sat through college graduations both as a graduate and as a parent. It might be hard for the graduates to imagine, but graduations are even more enjoyable as a parent. I would also like to congratulate the parents and loved ones of the graduates. In large measure, their accomplishments are

enabled by your love and support. I know they are grateful and thankful, even if occasionally they forget to express it,

It is entirely appropriate that pomp and circumstance should accompany momentous events like births, watershed events like marriages, and exceedingly rare events like Saints' playoff victories.

College graduation is also one of those events that we should mark with the appropriate rituals.

The procession you witnessed tonight is an example of academic ritual. It is a beautiful thing to see. Faculty of all thirty-one departments at this University, from accounting to psychology, representing all the different colleges: Business, Education, Engineering, Liberal Arts, and Sciences, unite together and link arms in camaraderie as if they were an army marching out to face the true enemies of modern society, the economists (lawyers).

Anyone from New Orleans, the home of Mardi Gras, knows that celebrations often involve dressing in whimsical

costumes. So this evening for the graduation celebration we wear costumes from the 12th and 13th centuries.

Universities were first formed to train priests and ministers, which is why your academic gowns resemble clerical robes. The academic robe came in handy during the Middle Ages because classes were held in old, large, drafty, unheated buildings, sort of like the Liberal Arts Building. Long, heavy, black robes may have been appropriate for German winters, but they are probably not the most appropriate choice for the climate of New Orleans in May. It is safe to say that very few of you require protection from the cold this evening, or are headed for the priesthood, but what you wear tonight is part of a 700 year-old tradition. Don't worry if you have rented the robes; I have been assured they are sent to the cleaners at least once per century.

The commencement address is another academic tradition. Yesterday I went online and googled the words "commencement" and "May 21" and discovered that this very

day there will be 467 commencement addresses throughout the U.S. It seems that everyone from Big Bird at Villanova University to George W. Bush at a football and party school 90 miles from here, will mount a podium and tell people either how to get to Sesame Street or how to get to Washington. Well, of course there is a big difference between Sesame Street and Washington. One is a fantasy world of childish behavior unrelated to real life, and the other is a television program. Now that I think about it, the country just might be better off with Big Bird in the White House, and Bert and Ernie in the House of Representatives. Senator Count would be sure the budget is balanced. And of course, Cookie Monster would be a great Supreme Court Justice.

Some commencement addresses have had historical significance. In the 1963 commencement address at American University in Washington, President Kennedy called on the Soviet Union and the United States to work together on a Nuclear Test Ban Treaty. At the Harvard commencement of

1947, Secretary of State George Marshall unveiled the "Marshall Plan," one of the greatest foreign policy successes of our country. A year earlier, Winston Churchill presented his famous "Iron Curtain" address at the Westminster graduation.

Of course, not every address has historical significance; but this one will. Probably no one here was present for the announcement of the Marshall Plan, but one day you will tell your children that you were present for the unveiling of "The Rocky Plan."

Now, the Rocky Plan is not, like the Marshall Plan, a plan to rebuild a continent destroyed by the most horrific war in history. But if you follow the Rocky Plan, I promise you will have a happy, productive, and fulfilling life.

The plan is simple. It has only seven rules. It's not even a 12-step program. It is so simple that Dr. Phil may one day endorse it.

Rule #1: Never, ever stop learning.

What you have learned in school will be a small fraction of what you will have to learn in your lifetime. The purpose of higher education is not job training, but rather, it is to teach you to think for yourself and to learn for yourself. I can only speak with authority about the physical sciences, but I believe what I say holds for every profession. If you stop learning the day you put down the pencil after your last college exam, you will be obsolete within five years.

I am confident that the dedicated faculty at UNO has instilled in you a deep love of learning and knowledge and the ability to think and learn for yourself. They did it for me 31 years ago. It was the most important thing I learned here.

Chancellor Ryan assures me that if any single one of you feels that your education at UNO only provided skill training and did not instill in you a love of learning and the ability to acquire new knowledge, he will personally and cheerfully refund every penny you have spent on tuition...from his own salary.

Rule #2: Live your life with passion.

A life without passion is not worth living. If you don't already have a passion, find one. People without passion are boring. Finding a passion is the easy part. The hard part is recognizing the difference between passion and obsession.

Rule #3: Exercise your talents.

The ancient Greeks believed that the key to happiness is the possession of a vital talent, and a life that enables you to exercise that talent. The fact that you are graduating is evidence that you possess talent. Do everything you can to exercise your unique talent.

Rule #4: Follow the cosmological principle.

I am a cosmologist, someone who studies the origin and makeup of the universe. (Not to be confused with a

cosmetologist...they study the universe of make up.) The cosmological principle states that there is no special place in the universe, that the universe looks the same if viewed from 10 billion light years away as it does from here. The universe is the ultimate democracy. What a profound thought. The cosmological principle is so powerful that totalitarian regimes have suppressed it. In the 1930s Stalin outlawed the teaching of relativity and cosmology because it undermined the ideas of Marx and Lenin. In 1989, a friend of mine, the Chinese cosmologist Fang Li Zhi was forced to seek sanctuary in the US Embassy in Beijing during the uprising in Tiananmen Square. Among his offenses was teaching the Cosmological Principle at the University of Science and Technology of China. While a refugee in the U.S. Embassy he received the Robert F. Kennedy Human Rights award. In his acceptance speech he wrote:

In the field of modern cosmology, the first principle is the "Cosmological Principle. It

states that the universe has no center, that it has the same properties throughout. Every place in the universe has, in this sense, equal rights. How can the human race, which has evolved in a universe of such fundamental equality, fail to strive for a society without violence and terror? How can we fail to build a world in which the rights of every human from birth are respected?

We live in a universe of equal rights. To oppose it, is to go against the laws that govern the very structure of the universe.

There is another lesson you can learn from the Cosmological Principle. Since everyplace in the universe is equivalent, the universe does not revolve around you. No <u>one</u>

person is the center of the universe. Someone please inform Donald Trump.

Since every point in the universe is equivalent, you might also interpret the Cosmological Principle as saying that you may view <u>every</u> point as the center of the universe. So you are, at the same time, the center of the universe, or not the center of the universe. People from William Blake to the 20th century physicist Niels Bohr have commented that while the opposite of a fact is a falsehood, the opposite of one profound truth may very well be another profound truth. So I guess at times you should act as if you are the center of the universe, and other times as if you are not. Understanding which to apply at any given time may well require the wisdom of age.

Rule #5: Beware the unknown knowns.

I was disappointed by Secretary of Defense Rumsfeld's recent characterization of things as known knowns, known unknowns, and unknown unknowns. The problem was that he

left out the most important one: the unknown knowns.

Perhaps it was a big mistake not to recognize that.

For example, it was once <u>known</u> that Earth is the center of the solar system. It was once <u>known</u> that Earth is 6,000 years old. It was once <u>known</u> that space is filled with aether, just as it was <u>known</u> that space and time are separate. Some of the greatest scientific discoveries involved realizing that what everyone <u>knew</u> was wrong! As the great American philosopher Will Rogers once said, "The problem ain't what we don't know, the problem is what we know that ain't so."

Again, if I can generalize what I know of physical science, every one of us knows things that will turn out not to be true.

Be prepared to admit that what you <u>know</u> just might not be so.

Rule #6: Celebrate the miracles around you:

Life is full of miracles. Where are these miracles? You don't have to look any further than the tip of your nose to find

them. In the cubic inch of space under your nose are 400 quanta of radiation that are relics of the big bang and are 13.78 billion years old. In the space right under your nose is a quantum foam of virtual particles and antiparticles zipping in and out of existence. Finally the cubic inch of space under your nose contains the unknown mysterious dark matter and dark energy that make up 95% of the mass energy of the universe.

Miracles abound: the miracle of the physical world, the miracle of the natural world, the miracle of birth, of life, and the miracle of love. Walt Whitman said "To me, every hour of the light and dark is a miracle. Every cubic inch of space is a miracle." Appreciate and cherish the miracles around you.

Rule #7: Contribute to the defense of your country.

You don't have to shoulder a rifle to contribute to the defense of your country. You can do your part by making it worth defending.

In 1969, during the Vietnam era, Robert R. Wilson, the first director of Fermilab, appeared before a congressional hearing as part of the process of requesting funding from the federal government to construct the scientific tool that is still the world's most powerful "atom smasher." Senator John Pastore pressed him on what that scientific instrument was good for, and in particular, whether it contributed to national defense and national security. Wilson could have winked and said sure, it will contribute to defense, now please give us the money. But he replied: "No, sir, I do not believe so."

Pastore pressed him on the issue, asking "It has no value in that respect?"

Wilson responded clearly and eloquently. He said:

It has only to do with the respect with which we regard one another, the dignity of people, and our love of culture. It has to do with: are we good painters, good poets, good sculptors, great poets? It has to do

with all the things we really venerate in our country and are patriotic about. It has all to do with honor and country. But it has nothing to do directly with defending our country–except to help make it worth defending.

War, whether a cold war or a war on terror, can not prevent you from doing those things that make our country worth defending. Do your part and create great music, poetry, art and science. If you can't create, then appreciate, enjoy, and respect the creations of others.

The great astronomer Johannes Kepler lived and worked through the terrible brutality and violence of the Thirty-Years War in Europe. A friend of Kepler wrote to him (actually Kepler didn't have any friends...it is more accurate to say that an <u>acquaintance</u> of Kepler wrote to him) and asked how he could possibly manage to do astronomy with the world

crashing down around him. Kepler's reply was beautiful. He wrote:

When the storms rage around us and the state is threatened by shipwreck, we can do nothing nobler than to lower the anchor of our peaceful studies in the ground of eternity."

Lower the anchors of your peaceful studies into the ground of eternity. Speaking of eternity, when asked about some hot political issue, Einstein, Time magazine's person of the 20th century, said, "Politics is for the present, but an equation is something for eternity." Einstein's remark about an equation is just as true for art, music, literature, architecture, and the other things we cherish in our culture.

Let me add the words of Nobel laureate and physicist
Stephen Weinberg. In the closing of his book on cosmology,
"The First Three Minutes," Weinberg ends with the following
thought: "The effort to understand the universe is one of the

very few things that lifts human life a little above the level of farce, and gives it some of the grace of tragedy."

So be concerned about events in the world around you, but refuse to be dismayed. Cherish those things that lift the human spirit.

Follow these seven simple rules and you will be happy.

Again, I guarantee it. Try it! What do you have to lose? If the plan fails, Chancellor Ryan will give you a full refund.

I know you will make the most of what you learned and experienced here at UNO. Nearly one billion people in the world have never heard a dial tone. We are exceedingly privileged to live in this country, and to have attended this great university. I know you will make the most of what you have learned.

Just to prove I haven't lost my Southern roots, let me end by saying once again to the graduates, <u>Congratulations y'all!</u>

Edward W. Kolb New Orleans, Louisiana May 21, 2004